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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/596,909	06/28/2006	Takashi Kumabe	NIS-16743	2102
40854	7590	02/19/2009		
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WILLOUGHBY, OH 44094-7808				
EXAMINER				
SHAPIRO, JEFFERY A				
ART UNIT		PAPER NUMBER		
3653				
MAIL DATE		DELIVERY MODE		
02/19/2009		PAPER		

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

## Office Action Summary

**Application No.**

10/596,909

**Applicant(s)**

KUMABE ET AL.

**Examiner**

JEFFREY A. SHAPIRO

**Art Unit**

3653

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 28 June 2006.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-12 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-12 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO/SF/ICE)  
Paper No(s)/Mail Date 7/20/06
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date \_\_\_\_\_
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: \_\_\_\_\_

**DETAILED ACTION**

***Claim Rejections - 35 USC § 112***

1. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

2. Claim 2 is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.
3. It is not understood how changing the total of required coins is achieved by changing an installation position of at least one of the first and second electrodes since the electrodes and their relationship to the rest of the elements are not adequately defined.
4. Claim 8 is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.
5. It is unclear what coin is being referred to as both electrodes are at opposite ends of the row of coins. Also, can a row of coins be considered to be a row of one coin?
6. Claims 9 and 10 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.
7. It is unclear what opposing surface is being referred to.

***Claim Rejections - 35 USC § 103***

8. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

9. This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

10. Claims 1, 2 and 4-12 are rejected under 35 U.S.C. 103(a) as being unpatentable over Ishida et al (US 2001/0023809 A1) in view of Schwartz (US 5,947,257).

Regarding Claims 1, 4, 7, 8, 10 and 11, Ishida discloses a coin validator (100) in a vending machine, as illustrated in figure 1 and mentioned at paragraph 4, in which coins are placed in coin holders in the form of coin tubes (5a-5e).

Ishida does not expressly disclose, but Schwartz discloses a coin holding portion (32-38), which holds coins in a row, said coins held in electrical connection in series, with a first electrode (78) and a second electrode (78), the first electrode being the first, top element (78), the second electrode being the bottom element (78), as illustrated in figure 3.

At the time of the invention, it would have been obvious to one of ordinary skill in the art to have added a coin tube stack detection and valuation device, as taught by Schwatz, in Ishida's device, for the purpose of automatically counting the number of coins in a stack. Such a stack is considered to be a row.

Regarding Claim 2, note that it would have been obvious to one of ordinary skill to have added or removed electrodes depending upon the size of the row, and thus the value of coins desired to be counted.

Regarding Claim 5, note that the installation position of the first and second electrodes is movable in some fashion.

Regarding Claim 6, note that the lower end is under the upper end and that the entire stack is held erect.

Regarding Claim 8, note that the top coin and the bottom coin edges are considered peripheries of the respective coins and come in contact with the electrodes.

Regarding Claim 9, note that the walls of the coin tubes are considered to be plates.

Regarding Claim 12, note slide groove (60) and positioning portion (42) of Schwartz.

11. Claim 3 is rejected under 35 U.S.C. 103(a) as being unpatentable over Ishida et al (US 2001/0023809 A1) in view of Schwartz (US 5,947,257) and further in view of Bell (US 5,433,310).

Ishida discloses the device described above.

Ishida does not expressly disclose, but Bell discloses using the value of the electric current to determine whether or not a coin is genuine or not. Bell discloses sending electric current in the form of an electromagnetic field into a coin and the data of the received electrical signal is compared to data stored in memory, after which, a determination as to validity is made based upon how well the electrical signal detected matches the stored signal criteria. See Bell, abstract and figures 4-8 and col. 9, lines 57-62, in which it is stated that brass coins have a conductivity that is higher than silver alloy coins.

At the time of the invention, it would have been obvious to one of ordinary skill in the art to have used the signal generated by the electrical signal as it flows through the stack/row and compare the signal to a reference signal, as taught by Bell, in Ishida's device, for the purpose of determining the genuineness/validity of the coins in a stack.

12. Any inquiry concerning this communication or earlier communications from the examiner should be directed to JEFFREY A. SHAPIRO whose telephone number is (571)272-6943. The examiner can normally be reached on Monday-Friday, 9:00 AM-5:00 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Patrick H. Mackey can be reached on (571)272-6916. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Jeffrey A. Shapiro/  
Examiner, Art Unit 3653

February 17, 2009.